

REMARKS

The Interview Summary of the telephone interview on 26 June 2003 is accurate. This interview was not requested by Applicant, and the only statement made by Applicant's attorney was to respectfully decline accepting the amendment proposed by the Examiner.

A Declaration of Edward Rahe is enclosed. This declaration is being presented because the Examiner noted in the present office action that a similar declaration from the applicant would be give little weight because it was made by applicant and it did not include data. The present declaration could not be presented earlier because it could not be anticipated that the examiner would take this position.

Claim Rejections – 35 USC §112

Claim 18 has been rejected as being indefinite because the relationship between the two bends and how this structure contributes to the "double-thick" flange was unclear. The relationship of the two bends and how this structure contributes to the "double-thick" flange has been added by amendment; thus, this rejection is believed to be overcome.

Claim 21 has been rejected as indefinite because some limitations are written as method limitations and the structure has not been positively recited. The method limitations have been removed by amendment and replaced with positive recital of the structure; therefore, this rejection is believed to be overcome.

Claim Rejections – 35 USC §103

Claims 1 – 12, 14 – 17, 22, 25 – 28, and 39 – 42 were rejected under 35 U.S.C. 103(a) as being unpatentable over Sobolev (US 5,30,488) in view of Fitzgerald et al (US 4,842,241). This rejection is respectfully traversed.

With regard to claim 1, Sobolev does disclose the use of steel in a laminate panel, as the Examiner points out. However, the disclosure of steel is minimal. In a patent with ten pages of figures and 38 columns of specification, steel is only mentioned in line 28 in a recitation of many metals that *may* be used in a laminate panel and in column 19, line 50 as being used in an example that failed. In this example, the plastic core cracked under the impact test. As a result, another example was run with an *aluminum* facing. To one skilled in the art, this suggests that the steel was too hard and thus transmitted too much

S rial No. 09/993,733

Amendment And Remarks Responsive To

Final Office Action Mailed 07/07/03

Pag 6

186217v2

force on impact. Fitzgerald et al. does not disclose that high-density polyethylene can be used in a panel. It discloses that high-density polyethylene is strong enough to be used by itself in a concrete form, though *only for test specimens*. Further, it teaches that polyethylene releases easily from concrete. This ease of release is not needed in a panel, since the polyethylene does not touch the concrete. In fact, it may be a negative since in a panel a material that sticks and does not release is desirable.

To establish a prima facie case of obviousness, three basic criteria must be met. First, there must be some suggestion or motivation, either in the references themselves or in the knowledge generally available to one of ordinary skill in the art, to modify the reference or to combine teachings. Second, there must be a reasonable expectation of success. Finally, the prior art reference (or references when combined) must teach or suggest all of the claim limitations. The teaching or suggestion to make the claimed combination and the reasonable expectation of success must both be found in the prior art, and not based on applicant's disclosure. *In re Vaeck*, 947 F.2d 488, 20 USPQ2d 1438 (Fed.Cir. 1991). MPEP 4142 and MPEP 2143 – 2143.03.

Here, one important limitation, the use of high-density polyethylene in a panel, is missing, so not all of the claim limitations are taught or suggested. Secondly, there is no reasonable expectation of success, since the plastic core in one panel in which steel was used in Sobolev cracked under the impact test. Further, there is no reason to expect that high-density polyethylene and steel will bond well, since no such bonding is disclosed. Put in terms of the first requirement for a prima facie case, the claimed invention is not reached by the combination of the references, but rather requires a modification, i.e., the use of high-density polyethylene in a panel. This modification is not suggested in the references. In summary, when Sobolev and Fitzgerald et al. are read together, it does not emerge that a panel out of steel and high-density polyethylene would be particularly useful for making concrete formwork panels.

While it is strongly believed that a prima facie case of obviousness has not been made out by the Examiner, even if it has, this prima facie case is overcome by the Declaration of Edward Rahe (hereinafter "Declaration"). Edward Rahe is Vice-President of

Serial No. 09/993,733

**Amendment And Remarks Responsive To
Final Office Action Mailed 07/07/03**

Page 7
186217v2

Engineering for the leading concrete formworks manufacturer in the United States. See the Declaration, paragraph 1, and the enclosed Exhibit A which is the home page of Symons.com. Mr. Rahe has tested scores of different concrete formwork panels as part of his job, and the panel described by claim 1 of this application is the best he has ever tested. See the Declaration, paragraph 9. The combination of steel facing with a high-density polyethylene core provides a concrete formwork panel that is vastly superior to all previous concrete formwork panels. See the Declaration, paragraph 8. The data for the most important test is presented in Exhibit B to the Declaration. This is surprising to one skilled in the art. See the Declaration, paragraph 11. A prima facie case of obviousness is rebuttable by proof that the claimed invention possesses unexpectedly advantageous or superior properties. MPEP 716.02, 2144.08B, and 2144.09, seventh bold heading.

Claims 2 – 12, 14 – 17, 22, and 25 – 28 all depend on claim 1, and include all of the limitations of claim 1, and are therefore patentable at least for that reason. In addition, none of the limitations on the dependent claims are shown in the art for panels made of steel facing with a high-density polyethylene core. Certain of the claims, such as the foam density limitations of claims 11 and 12, include limitations nowhere disclosed in any of the references for any panel. The Examiner says that one could get these by experiment and cites *In re Boesch*. The *Boesch* facts were quite different than those at present. In *Boesch*, the claimed optimized values were all within ranges disclosed in the prior art, and the prior art suggested changing the values in the direction covered by the claims. Here, the values claimed are outside the ranges in the prior art. Likewise, all other allegations of the Examiner that specific limitations are obvious without showing a reference that suggests it, such as the limitations of claims 6 – 8, 14 – 17, and 22, are challenged on the basis that the Examiner's opinion is not a suitable replacement for a reference. *Ex Parte Nouel*, 158 USPQ 237, 239 (POBA 1967) at headnote 2.

With respect to claims 39 – 42, these claims are not addressed by the Office Action except in paragraph 21; therefore, we shall address them below.

Claim 18 was rejected under 35 U.S.C. 103(a) as being unpatentable over Sobolev in view of Fitzgerald et al. and further in view of Toedter (US 3,654,053). This rejection is

Serial No. 09/993,733

Amendment And Remarks responsive To

Final Office Action Mailed 07/07/03

Page 8

186217v2

respectfully traversed for the reasons given above with respect to claim 1, on which claim 18 depends. In addition, Toedter shows how to bend a decorative panel in two to make a panel that is twice as thick as the panel not bended. No suggestion that this can make a flange, much less a stronger flange, is included. The Examiner is using hindsight in making this combination.

Claims 19 and 20 were rejected under 35 USC 103(a) as being unpatentable over Sobolev in view of Fitzgerald et al. and further in view of Lee (US 6,295,786). This rejection is respectfully traversed for the reasons given above with respect to claim 1, on which claims 19 and 20 depend. In addition, Lee has nothing to do with concrete and the idea of even making a columnar panel is merely added as an afterthought. The Examiner is using the hindsight of the invention itself to find this combination.

Claim 23 was rejected under 35 USC 103(a) as being unpatentable over Sobolev in view of Fitzgerald et al. and further in view of Yoshida et al (US 6,117,521). This rejection is respectfully traversed for the reasons given above with respect to claim 1, on which claim 23 depends. In addition, none of the references discloses a rib attached to a metal backing layer.

Claims 23 and 24 were rejected under 35 USC 103(a) as being unpatentable over Sobolev in view of Fitzgerald et al. and further in view of Gallis et al (US 4,473,209). This rejection is respectfully traversed for the reasons given above with respect to claim 1, on which claims 23 and 24 depend.

Claims 39 – 41 were rejected under 35 USC 103(a) as being unpatentable over Sobolev. This rejection is respectfully traversed. The limitation of a foam plastic with 32% or more gas by volume is not shown or suggested in the art. The MPEP specifically states that all limitations must be taught or suggested in the art. The Examiner cites *In re Boesch* as holding that discovering the optimum value of a variable is obvious. However, *Boesch* only applies when the range disclosed in the art includes the alleged optimum value. Here, the limitation is outside the range suggested in the art.

Applicant argued in the previous response that Sobolev teaches away from a core density greater than 30%. Applicant still believes this is true, and incorporates the previous

Serial No. 09/993,733

Amendment And Remarks Responsive To

Final Office Action Mailed 07/07/03

Pag 9

186217v2

argument by reference. However, this argument is not required really, and the Examiner's argument on page 15, first full paragraph, through page 16 shows this clearly. The Examiner argues strongly that the claimed core ranges of Applicant are "not excluded" by Sobolev. The Examiner has the cart before the horse. It is not up to Applicant to show they are excluded; it is up to the Examiner to show that they are included. The Examiner must show positively that something is disclosed in a reference, not merely that the claimed invention is possible in view of a reference. MPEP 2143.01.

The Declaration of Gregory D. Johnson was deemed to have little weight because no data was given and the declaration was made by applicant. While it is believed to be no requirement in the MPEP that data be presented or that declarations by the inventor are suspect, a declaration that overcomes these alleged shortcomings is enclosed.

In view of the foregoing, claims 1 – 12, 14 – 28, and 39 – 42 are patentable, and their reconsideration and allowance are respectfully requested. No fee for this amendment is seen to be required. However, if any fee is required, please charge it to Deposit Account No. 50-1848.

Respectfully submitted,
PATTON BOGGS LLP

By: 

Carl A. Forest, Reg. No. 28,494
Telephone: (303) 894-6114
Facsimile: (303) 894-9239
Customer No.: 24283

S rial No. 09/993,733
A mendment And **R** marks **R** sponsiv To
F inal Office Action Mailed 07/07/03
P age 10
186217v2